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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/501,434	02/10/2000	John S. Lee	510.030US1	3838
27073	7590	08/22/2005	EXAMINER	
LEFFERT JAY & POLGLAZE, P.A.			CHU, KIM KWOK	
P.O. BOX 581009			ART UNIT	
MINNEAPOLIS, MN 55458-1009			PAPER NUMBER	
			2653	

DATE MAILED: 08/22/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/501,434	LEE ET AL.	
	Examiner	Art Unit	
	Kim-Kwok CHU	2653	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 28 March 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 2,4-8,10-12,28,29 and 31-34 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 2,4,6,8,10,12,28,29 and 31 is/are allowed.
- 6) ☒ Claim(s) 5,7,11 and 33 is/are rejected.
- 7) ☒ Claim(s) 32 and 34 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 19 April 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Response to Remarks

1. Applicant's Remarks filed on March 28, 2005 have been fully considered.

Applicant states that the prior art of Hayashi does not teach a single gripping head that holds two discs (page 9 of the Remarks, last paragraph). Accordingly, Hayashi teaches a gripping head 9 which holds two discs (Fig. 2; column 3, lines 2-4). The gripping head 9 having four pallets where each set of two pallets contains a disc (Fig. 9; column 6, lines 57 and 58).

Since each set of pallets in the carriage 9 can hold a disc, the cited prior art of Hayashi's carriage 9 teaches "first and second compact discs are held in fixed relative positions at the same time along a common axis in different planes".

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. § 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 5, 11 and 33 are rejected under 35 U.S.C. 103 (a) as being unpatentable over Balsom. (U.S. Patent 5,592,596)) in view of Hayashi et al. (U.S. Patent 6,304,525).

Balsom teaches a compact disc processing system very similar to that of the instant invention. For example, Balsom teaches the following means and steps:

(a) as in claim 5, a printer 50 for printing indicia on a first compact disc (Column 6, lines 17-20);

(b) as in claim 5, a recorder 43 for recording information on the first compact disc (column 2, lines 9-12);

(c) as in claim 5, a transporter carriage 45 for holding the first compact disc and moving the first compact disc to reach the recorder 43 (Fig. 1b);

(d) as in claim 5, a plurality of disc trays 48 (Fig. 1b); and

(e) as in claim 5, a selection mechanism 45 coupled to the plurality of disc trays 48 for selectively moving the plurality of disc trays such that the first compact disc can be placed on the selected disc tray for temporary storage (Fig. 1b).

However, Balsom does not teach the following:

(a) as in claim 5, the transporter carriage for holding the first compact disc and moving the first compact disc between the recorder and the printer;

(b) as in claim 5, the transporter carriage comprises a single gripping head rotatable about a horizontal axis having first and second locations each for respectively gripping and directly holding the first and second compact disc simultaneously by the single gripping head;

(c) as in claim 5, the first and second compact discs are held in fixed relative positions coextensive along a common axis in different planes while the first and second compact discs are engaged by the gripping head; and

(d) as in claim 33, the gripping head 9 includes a motor 55 for selectively rotating the first compact disc about its axis (Fig. 4).

Hayashi teaches a disc inverting mechanism having above features. For example, Hayashi teaches the following:

(a) a transporter carriage 8 for gripping the first compact disc and moving the first compact disc in both vertical and horizontal direction (Fig. 4);

(b) the transporter carriage 8 comprises a single horizontally rotatable gripping head 9 having first and second locations each for respectively gripping and directly holding the first and second compact disc simultaneously by the single gripping head (Fig. 2);

(c) the first and second compact discs are engaged by the gripping head 9 (Fig. 4);

(d) the first and second compact discs are held in fixed relative positions while the first and second compact discs are engaged by the gripping head 9 (Fig. 4); and

(e) the gripping head 9 includes a motor 55 for selectively rotating the first compact disc about its axis (Fig. 4).

A typical disc labeling system such as Balsom's requires a disc conveying mechanism for transporting a selected disc from one location such as a recording means to another location such as a labeling means. For example, Hayashi uses a vertical and horizontal moveable transporter to convey and rotate a disc from one location to another location. Hence, when there is an advantage of simplifying the transportation mechanism of Balsom's labeling processes, it would have been obvious to one

of ordinary skill in the art to use Hayashi's disc transporting and disc rotating means in Balsom's disc labeling processes, because Hayashi's transporter can select a disc from a plurality of disc storage means in one location and then move and flip over the selected disc to the printer similar to the claimed features.

4. Claim 11 has limitations similar to those treated in the above rejection, and is met by the references as discussed above. Claim 11 however also recites the following limitations:

(a) as in claim 11, the transporter carriage comprises a pickup arm and a gripping head attached to one end of the pickup arm (Fig. 2);

(b) as in claim 11, the gripping head has first and second gripping locations each for respectively gripping the first and second compact discs simultaneously such that the first and second compact discs maintain a fixed axial position while encaged by the gripping head; and

(c) the gripping head is rotatable about a horizontal axis of the pick up arm.

Hayashi teaches a disc gripping and inverting mechanism having above features. For example, Hayashi teaches the following:

(a) as in claim 11, the transporter carriage 8 comprises a pickup arm 21 and a gripping head 9 attached to one end of the pickup arm (Fig. 4; frame 21 is the pickup arm holding the gripping head 9);

(b) as in claim 11, the gripping head 9 has first and second gripping locations each for respectively gripping the first and second compact discs simultaneously such that the first and second compact discs maintain a fixed axial position while encaged by the gripping head (Figs. 4 and 5); and

(c) as in claim 11, the gripping head 9 is rotatable about a horizontal axis of the pick up arm (Fig. 4).

A typical disc labeling system such as Balsom's requires a disc conveying mechanism for transporting selected discs from one location such as a recording means to another location such as a labeling means. For example, Hayashi uses a rotatable gripping means having two gripping locations to convey and rotate selected discs from one location to another location. Hence, when there is an advantage of simplifying the disc holding mechanism of Balsom's labeling processes, it would have been obvious to one of ordinary skill in the art to use Hayashi's disc gripping and disc rotating means in Balsom's disc labeling processes, because Hayashi's transporter carriage can hold discs selected from a plurality of disc storage means

in one location and then move and flip over the selected discs to the printer similar to the claimed features.

5. Claim 7 is rejected under 35 U.S.C. 103 (a) as being unpatentable over Balsom. (U.S. Patent 5,592,596)) in view of Hayashi et al. (U.S. Patent 6,304,525).

Balsom teaches a compact disc processing system very similar to that of the instant invention. For example, Balsom teaches the following means and steps:

(a) as in claim 7, a printer 50 for printing indicia on a first compact disc (Column 6, lines 17-20);

(b) as in claim 7, a recorder 43 for recording information on the first compact disc (column 2, lines 9-12);
and

(c) as in claim 7, a transporter carriage 45 for gripping the first compact disc and moving the first compact disc to reach the recorder 43 (Fig. 1b; gripping means holding tight).

However, Balsom does not teach the following:

(a) as in claim 7, the transporter carriage for holding the first compact disc and moving the first compact disc between the recorder and the printer;

(b) as in claim 7, the transporter carriage comprises a single gripping head rotatable about a horizontal axis having first and second locations each for respectively gripping and

directly holding the first and second compact disc simultaneously by the single gripping head;

(c) as in claim 7, the first and second compact discs are held in fixed relative positions coextensive along a common axis in different planes while the first and second compact discs are engaged by the gripping head; and

(d) as in claim 7, the gripping head includes a motor for selectively rotating the first compact disc about its axis.

Hayashi teaches a disc inverting mechanism having above features. For example, Hayashi teaches the following:

(a) a transporter carriage 8 for gripping the first compact disc and moving the first compact disc in both vertical and horizontal direction (Fig. 4);

(b) the transporter carriage 8 comprises a single horizontally rotatable gripping head 9 having first and second locations each for respectively gripping and directly holding the first and second compact disc simultaneously by the single gripping head (Fig. 2);

(c) the first and second compact discs are engaged by the gripping head 9 (Fig. 4);

(d) the first and second compact discs are held in fixed relative positions while the first and second compact discs are engaged by the gripping head 9 (Fig. 4); and

(e) as in claim 7, the gripping head 9 includes a motor 55 for selectively rotating the first compact disc about its axis (Fig. 4).

A typical disc labeling system such as Balsom's requires a disc conveying mechanism for transporting a selected disc from one location such as a recording means to another location such as a labeling means. For example, Hayashi uses a vertical and horizontal moveable transporter to convey and rotate a disc from one location to another location. Hence, when there is an advantage of simplifying the transportation mechanism of Balsom's labeling processes, it would have been obvious to one of ordinary skill in the art to use Hayashi's disc transporting and disc rotating means in Balsom's disc labeling processes, because Hayashi's transporter can select a disc from a plurality of disc storage means in one location and then move and flip over the selected disc to the printer similar to the claimed features.

Allowable Subject Matter

6. Claims 2, 4, 6, 8, 10, 12, 28, 29 and 31 are allowable over prior art.

7. Claims 32 and 34 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

8. The following is an Examiner's statement of reasons for the indication of allowable subject matter based on the Amendment filed on November 12, 2004.

As in claims 2, 8, 12 and 34, the prior art of record fails to teach or fairly suggests the following features:

(a) the transporter carriage grips the first and second compact discs using a vacuum.

As in claims 6 and 32, the prior art of record fails to teach or fairly suggests that the compact disc processing system having the following features:

(a) a supply location having a vertically extending rod sized to fit within a central opening provided in the first compact disc.

As in claim 10, the prior art of record fails to teach or fairly suggests that the compact disc processing system having

the following features:

(a) a supply location having a vertically extending rod sized to fit within a central opening provided in the first compact disc.

As in claim 28, the prior art of record fails to teach or fairly suggests that a compact disc processing system having the following features:

(a) a vacuum pump coupled to the gripping head to selectively provide a vacuum to the first and second gripping locations.

As in claim 31, the prior art of record fails to teach or fairly suggests that a compact disc processing system having the following features:

(a) a plurality of deflectable fingers which extend from the gripping head.

The features indicated above, in combination with the other elements of the claims, are not anticipated by, nor made obvious over, the prior art of record.

Conclusion

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Phillips (6,285,648) is pertinent because Phillips teaches a disc transportation apparatus having a disc rotation means.

Kappel (5,995,459) is pertinent because Kappel teaches a disc transportation apparatus having a disc rotation means.

10. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action

11. Any response to this action should be mailed to:

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Or faxed to:

(571) 273-8300 (for formal communications intended for entry. Or:

(571) 273-7585, (for informal or draft communications, please label "PROPOSED" or "DRAFT")

Any inquiry of a general nature or relating to the status of this application should be directed USPTO Contact Center (703) 308-4357; Electronic Business Center (703) 305-3028.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kim CHU whose telephone number is (571) 272-7585 between 9:30 am to 6:00 pm, Monday to Friday.

Kim-Kwok CHU

lc 8/15/05
Examiner AU2653
August 15, 2005

William Korzuch
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SUPERVISORY PATENT EXAMINER
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